

REMARKS

Please reconsider the application in view of the above amendments and the following remarks. Applicant thanks the examiner for carefully considering this application.

Disposition of the Claims

Claims 1-37 were previously withdrawn due to a restriction requirement. Therefore, claims 38-63 are pending in this application. Claims 38-63 were rejected as indefinite under 35 U.S.C. 112, second paragraph. Claims 38-50 and 52-63 stand rejected under 35 U.S.C. § 102(b) as being anticipated by U.S. Patent No. 6,214,949 issued to Reddy. Claims 38-46 and 48-63 stand rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over U.S. Patent No. 6,069,213 issued to Nemzek.

Claim Amendments

By this amendment, Applicant has amended claims 38-40. Claim 38 has been amended to limit the bimetallic catalyst to a catalyst where both the first and second catalyst components are supported on a common support; support for this amendment can be found, *inter alia*, in the specification at paragraphs [0029]-[0036]. Claims 39 and 40 have been amended for clarification and to maintain antecedent support. No new matter has been introduced by these amendments. These amendments do not constitute a surrender of subject matter, as the original claims may be pursued in a continuation.

Amendments to the Specification

By this amendment, Applicant has amended specification paragraphs [0019] and the title before paragraph [0090]. Paragraph [0019] has been amended to define a “catalyst component” as opposed to a “catalyst compound.” Support for this amendment can be found throughout the specification, and in particular in paragraphs [0017] and [0029]-[0042]. The language of paragraph [0019] has been amended to be consistent with the language of paragraph [0017], which states “a ‘catalyst system’ includes at least one ‘catalyst component’ and at least one ‘activator,’ both of which are described further herein.”

The caption immediately prior to paragraph [0090] has been amended to refer to “Additionally-Discovered Catalyst Compounds.” Paragraph [0071] indicates that the MAO-activable compound may be a Group-15-component-containing compound; a phenoxide catalyst compound; an additionally-discovered catalyst compound; or a conventional transition metal catalyst compound. The amendment to the caption immediately prior to paragraph [0090] conforms the caption to the language used in paragraph [0071], similar to the captions for the other MAO-activable compounds as discussed in the order presented in paragraph [0071].

Rejections under 35 U.S.C. § 112, Second Paragraph

Claims 38-63 were rejected as indefinite under 35 U.S.C. 112, second paragraph. Specifically, the intended scope of claim 38 was unclear due to the use of “catalyst component” where the specification defined “catalyst compound;” claim 39 was indefinite as it could not be determined whether “carrier” was in addition to the support specified in the parent claim, claim 38; and, claim 56 was indefinite as the scope of “additionally-discovered catalyst compound” could not be determined.

With regard to the rejection of claim 38, paragraph [0019] of the specification has been amended to define a “catalyst component” as a compound that, once appropriately activated, is capable of catalyzing the polymerization or oligomerization of olefins. The specification and claims are therefore consistent, and Applicant respectfully requests withdrawal of the rejection of claim 38 under 35 U.S.C. 112, second paragraph.

With regard to the rejection of claim 39, claim 39 has been amended to remove the requirement for an additional carrier. Applicant respectfully requests withdrawal of the rejection of claim 39 under 35 U.S.C. 112, second paragraph.

With regard to the rejection of claim 56, the title prior to paragraph [0090] of the specification has been amended to be consistent with paragraph [0071], as described above. As paragraphs [0090] through [0095] describe the “additionally-discovered catalyst compounds” of claim 56, the scope of claim 56 is readily ascertainable, and Applicant respectfully requests withdrawal of the rejection of claim 56 under 35 U.S.C. 112, second paragraph.

Rejections under 35 U.S.C. § 102(b)

Claims 38-50 and 52-63 stand rejected under 35 U.S.C. § 102(b) as being anticipated by U.S. Patent No. 6,214,949 issued to Reddy (“Reddy”). To the extent that the rejection still applies to the claims as amended, the rejection is respectfully traversed.

Generally, embodiments of Applicant’s invention provide for a supported, treated catalyst system produced by a process comprising the steps of (a) forming a supported bimetallic catalyst system comprising a first catalyst component and a second catalyst component; and (b) contacting the supported bimetallic catalyst system with a methylalumoxane-activable compound. Applicant defines a catalyst component as a compound that, once appropriately activated, is capable of

catalyzing the polymerization or oligomerization of olefins. Additionally, in the supported bimetallic catalyst system, both the first and second catalyst components are supported on a common support.

Reddy discloses the use of a catalyst system comprising a supported Ziegler-Natta catalyst and one or more unsupported metallocene catalysts for the polymerization of olefins. Reddy relates to the combination of two particular types of catalysts for the polymerization of olefins, where any of the conventional supported Ziegler-Natta transition metal compound catalysts or mixtures of supported Ziegler-Natta catalysts can be used (column 5, lines 25-51). The catalyst system is formed by a) selecting a conventional supported Ziegler-Natta catalyst component and b) contacting the catalyst with at least one metallocene compound, among other steps (column 2, lines 33 to column 4, line 25). In a particular embodiment, the supported Ziegler-Natta catalyst component may be contacted with both a bridged and an unbridged metallocene (column 3, line 42 to column 4, line 25).

Regarding claim 38, Reddy fails to disclose a supported, treated catalyst system produced by a process comprising the steps of (a) forming a supported bimetallic catalyst system comprising a first catalyst component and a second catalyst component, where both the first and second catalyst components are supported on a common support material; and (b) contacting the supported bimetallic catalyst system with a methylalumoxane-activatable compound. A claim is anticipated only if each and every element as set forth in the claim is found in a single prior art reference. *Verdegaal Bros. v. Union Oil Co. of California*, 814 F.2d 628 (Fed. Cir. 1987); MPEP 2131. Reddy merely discloses the use of a mixture of Ziegler-Natta catalyst components, and does not disclose the

intimate intermingling of catalyst compounds on a common support, as required by claim 38. Thus, because Reddy fails to disclose each limitation of claim 38, claim 38 is patentable in view of Reddy. Claims depending from claim 38, including claims 39-50 and 52-63, are also patentable for at least the same reasons. Accordingly, withdrawal of this rejection is respectfully requested.

Rejections under 35 U.S.C. § 102(b) and 35 U.S.C. § 103(a)

Claims 38-46 and 48-63 stand rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over U.S. Patent No. 6,069,213 issued to Nemzek (“Nemzek”). To the extent that the rejection still applies to the claims as amended, the rejection is respectfully traversed.

Nemzek discloses the use of a catalyst composition having at least one unsupported metallocene polymerization catalyst with at least one supported metallocene polymerization catalyst in the polymerization of olefins (column 1, lines 24-29). Additionally, there may be more than one of each supported and unsupported catalyst, so long as there is at least some supported and unsupported metallocene catalyst in the system (column 2, lines 1-7).

Regarding claim 38, Nemzek also fails to disclose a supported, treated catalyst system produced by a process comprising the steps of (a) forming a supported bimetallic catalyst system comprising a first catalyst component and a second catalyst component, where both the first and second catalyst components are supported on a common support; and (b) contacting the supported bimetallic catalyst system with a methylalumoxane-activatable compound. Nemzek merely discloses the use of a mixture of catalyst compounds, and does not teach, show, or suggest the intimate intermingling of catalyst compounds on a common support, as required by claim 38. Thus, because

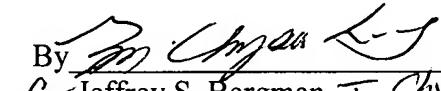
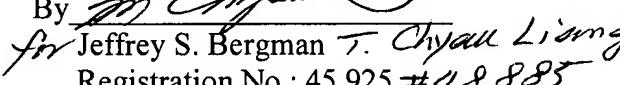
Nemzek fails to show or suggest each limitation of claim 38, claim 38 is patentable in view of Nemzek. Claims depending from claim 38, including claims 39-46 and 48-63, are also patentable for at least the same reasons. Accordingly, withdrawal of this rejection is respectfully requested.

Applicant respectfully requests that the Attorney Docket Number be changed to 2003U043.US.

Applicant believes this reply is fully responsive to all outstanding issues and places this application in condition for allowance. If this belief is incorrect, or other issues arise, the Examiner is encouraged to contact the undersigned or his associates at the telephone number listed below. Please apply any charges not covered, or any credits, to Deposit Account 50-0591 (Reference No. 17224/015001).

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Respectfully submitted,

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